

WHAT IS CLAIMED IS:

1. Apparatus comprising:

- a first component configured to forward data based on a lookup in a routing table;
- a second component configured to receive the data; and
- an intermediate component bridging the first component and the second component to forward the data in a manner that does not require a routing table lookup.

2. The apparatus of claim 1 comprising additional intermediate components bridging the first component and the second component to forward the data in a manner that does not require a routing table lookup.

3. The apparatus of claim 1 wherein the first component is configured to receive a packet from a first host and the second component is configured to deliver the packet to a second host.

4. The apparatus of claim 3 wherein the routing table used to set a path from the first component to the second component is computed by determining a port that leads to the second host.

5. The apparatus of claim 3 wherein the data comprises a request for an address to which to send the packet; the first component is configured to forward the request; the

intermediate component in the path is configured to forward the request to the second component without looking up the routing table; and the second component is configured to receive the request and to send its address back to the first component.

6. The apparatus of claim 1 wherein the data is part of a packet, and the first component is configured to encapsulate the packet with the address of the second component and to forward the encapsulated packet through the intermediate component to the second component.

7. The apparatus of claim 6 wherein the intermediate component act as a transparent bridge to forward the request and the packet.

8. The apparatus of claim 6 wherein the second component is configured to route the packet received through the intermediate component to a second host.

9. The apparatus of claim 1 wherein the first component, the intermediate component, and the second component are connected through a network medium.

10. The apparatus of claim 9 wherein the network medium comprises Ethernet.

11. The apparatus of claim 1 wherein the routing system is configured to support address resolution protocol.

12. A method comprising:

performing a lookup in a routing table to determine a path to send data from a sender to a receiver; and

forwarding the data, without performing a lookup in the routing table, through an intermediate component between a first component connected to the sender and a second component connected to the receiver.

13. The method of claim 12 further comprising:

forwarding the data without looking up the routing table through additional intermediate components between the first component and the second component.

14. The method of claim 12 further comprising:

sending a packet from the sender to the first component; and

routing the data comprising a request for an address of the second component from the first component.

15. The method of claim 14 further comprising:

forwarding the request through the intermediate components; and

sending a reply from the second component to the intermediate component; and

forwarding the reply from the intermediate component without looking up the routing table to the first component.

16. The method of claim 12 further comprising:
encapsulating the data comprising a packet with address information of the second component; and

forwarding the encapsulated packet to the second component through the intermediate component without looking up the routing table.

17. The method of claim 16 further comprising:
routing the packet from the second component to the receiver.

18. An article comprising a machine-readable medium that stores machine-executable instructions for causing a machine to:

performs a look up in a routing table to determine a path to send data from a sender to a receiver; and

forward the data, without looking up the routing table, through an intermediate component between a first component connected to the sender and a second component connected to the receiver.

19. The article of claim 18 further causing the machine to:

forward the data, without looking up the routing table, through additional intermediate components between the first component and the second component.

20. The article of claim 18 further causing the machine to:

send a packet from the sender to the first component; and route the data comprising a request for an address of the second component from the first component.

21. The article of claim 20 further causing the machine to:

forward the request through the intermediate components; and

send a reply from the second component to the intermediate component; and

forward the reply from the intermediate component, without looking up the routing table, to the first component.

22. The article of claim 18 further causing the machine to:

encapsulate the data comprising a packet with address information of the second component; and

forward the encapsulated packet to the second component through the intermediate component without looking up the routing table.

23. The article of claim 22 further causing the machine to:

route the packet from the second component to the receiver.

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